

Model 802 Mini Tempered Water Mixing System with Recirculation, Smart Pump & RMS Deluxe Eng. No. 90020

CAPACITIES – MODEL 802 MINI

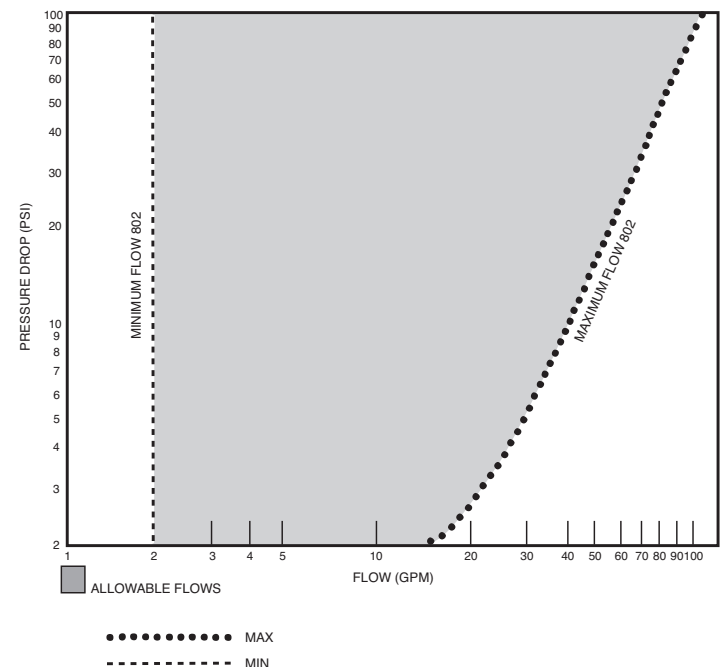
Pressure Drop PSI	5	10	20	30	45	60	80
Valve Number	Capacity						
802 MINI-GPM	28	39	54	66	80	91	103
802 MINI-LPM	106	148	208	247	303	341	388

1/2 gpm when properly installed in recirculated system.

Mixing valve shall be incorporated into a completely assembled and tested pre-piped manifold system which includes a Grundfos Magna3 32-60 F N pump, circuit setting balancing valve, thermometers, ball valves, mounting strut, and test connection.

Low Capacity water mixing valve shall be of the thermostatic type with liquid-filled thermal motor. It shall have lead free brass body construction with replaceable corrosion-resistant components. Valve construction shall employ a sliding piston control mechanism. Sliding piston and liner shall be of stainless steel material. Valve shall come equipped with union end stop and check inlets with removable stainless steel strainers. Valve shall provide three way protection against hot or cold supply line failure and thermostat failure. Valve minimum flow is 2 GPM (8 LPM). System minimum flow is 1/2 GPM when properly installed.

RMS unit shall include local and remote digital temperature monitoring. Four type J thermocouples shall provide continuous temperature monitoring as well as data logging. The RMS shall include modbus TCP/IP protocol and RJ-45 communications connection. The RMS shall include an alarm indicator and a built in web server. The RMS shall be powered by 120 VAC and ships wired and tested.

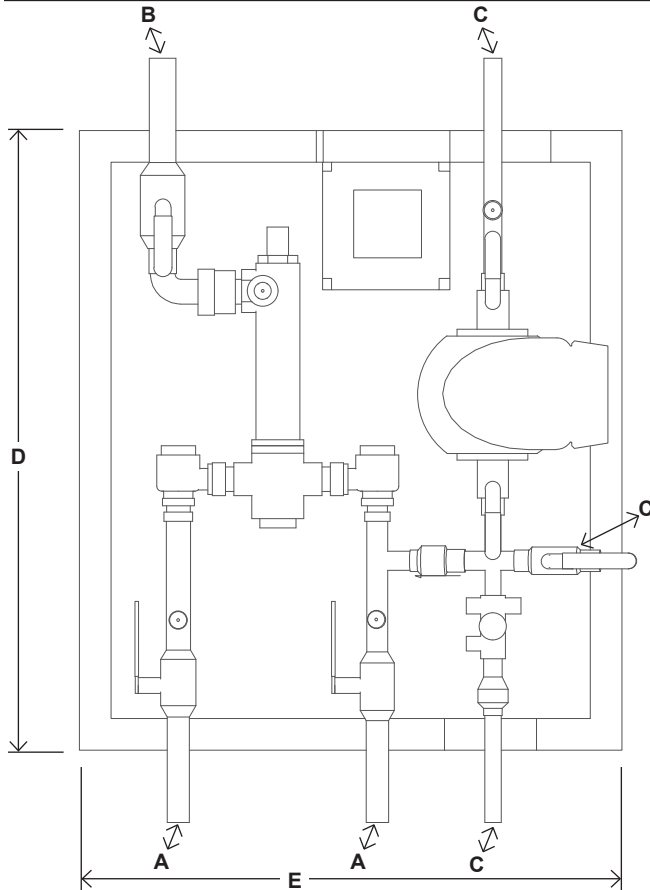


Pump curve can be found on page 2

FINISH: Brass ☐
Rough Chrome ☐
Other ☐

TEMP. RANGE **SET POINT**

70° to 100°F 80°F ☐
90° to 120°F 110°F ☐
110° to 140°F 130°F ☐
Special _____ ☐



DIMENSIONS

Valve Number	A	SWT	B	SWT	C	SWT	D	E
802 MINI	1"		1-1/4"		3/4"		34"	30"

Dimensions are for reference purposes only. For rough-in dimensions please refer to Lawler's Revit/BIM models found at temperedwater.com.

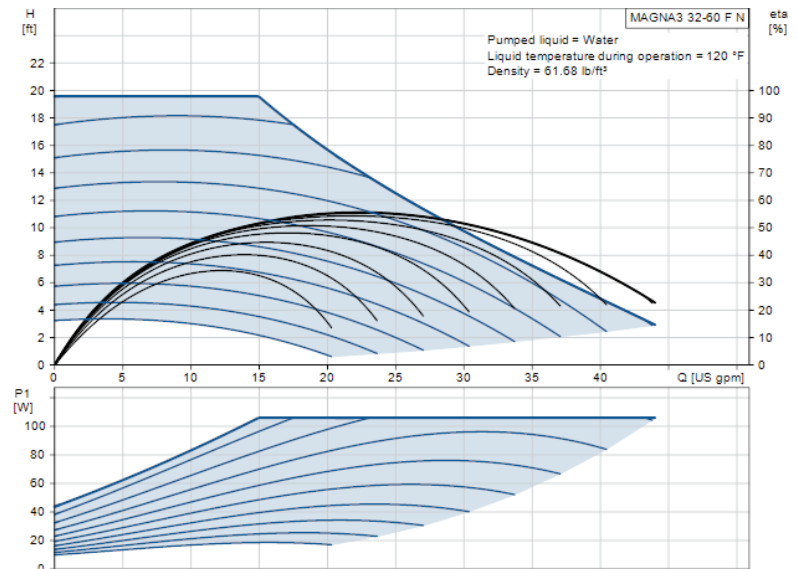
All connections are sweat connections.

Setting The Mixing Valve To The System

1. After installations be sure to flush the system thoroughly.
2. Make sure the hot water supply is heated to normal design temperature.
3. Close and tag all fixtures to ensure they are not used during this procedure.
4. Turn off the recirculating pump.
5. Create a draw on the system greater than the minimum flow rating of the mixing valve. All open fixtures must be tagged to ensure they are not tampered with or used during this procedure.
6. Allow water to flow through the mixing valve until the water temperature is stable. If necessary, readjust the mixing valve in accordance with the TEMPERATURE ADJUSTMENT section of the installation manual.
7. Once the temperature is set, start the recirculating pump and allow the system to reach set temperature.
8. Measure the water temperature at the return pump and adjust the aquastat to shut off the pump should the return water exceed the set point by 2 degrees F. Set the low limit switch to restart the return pump when return water drops 5 degrees F below the set temperature.
9. Set the balancing valve in the full open position.
10. Shut off all fixtures and ensure there is no draw on the system. The cold inlet to the mixing valve should be warm.
11. Allow the system to run in this condition for at least 30 minutes.
12. In some cases, an increase in water temperature may occur during a no draw period. If this occurs, slowly close the balancing valve until the water temperature is back to the original set temperature.

Pump Curve

Refer to www.grundfos.com for latest pump curve



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